

Nema Note 7-1



Nematode Parasites of Corn

www.ncagr.com/agronomi/uyrnem.htm

Laboratory analysis of this particular soil sample indicates the presence of a potential nematode hazard to corn. Good growing conditions usually limit nematode damage on this crop. However, when corn is stressed during the early part of the growing season, nematode damage can be severe, especially with sting nematodes.

In deciding whether to use nematicides, consider the field's history. Has nematode damage been a problem before? What kinds of nematodes are identified in the current assay? Have there been other agronomic problems, such as root diseases or nutrient deficiencies?

Although a wide range of nematode species can reproduce on corn, the crop is tolerant to most of them. Besides sting nematodes, other species that attack corn include stubby root, ring, root knot, lesion, stunt, needle, lance, dagger, spiral and corn cyst.

Sting and stubby-root nematodes feed on lateral roots and root tips, causing them to have a coarse or stubby appearance. Both nematodes can be responsible for scattered areas of stunted plants throughout a field. Chlorosis is often associated with stubby-root nematodes. Although sting nematodes occur almost exclusively in very sandy soils, stubby-root nematodes are widely distributed. Nonvolatile chemical nematicides are more effective than soil fumigants against stubby-root.

Lance, lesion, ring, root-knot and other nematodes are most likely to damage corn when populations are high and growing conditions are stressful. All of these nematodes reproduce on a wide range of crops, and no resistant corn varieties are available. Chemical nematicides can be effective in reducing populations.

For Additional Assistance

- Call your NCDA&CS regional agronomist or the Agronomic Division office in Raleigh (919-733-2655).
- Visit the NCDA&CS Agronomic Division Web site at www.ncagr.com/agronomi/.
- Visit your county Cooperative Extension office.
- Refer to the following online publications.
 - ***Corn nematodes*** (University of Nebraska, date not given)
— nematode.unl.edu/corn_nematodes.html
 - ***Field corn nematode management*** (University of Florida, 2005)
— edis.ifas.ufl.edu/NG014
 - ***Recognizing corn nematode problems*** (University of Illinois, 1999)
— www.ipm.uiuc.edu/bulletin/pastpest/articles/199903n.html

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